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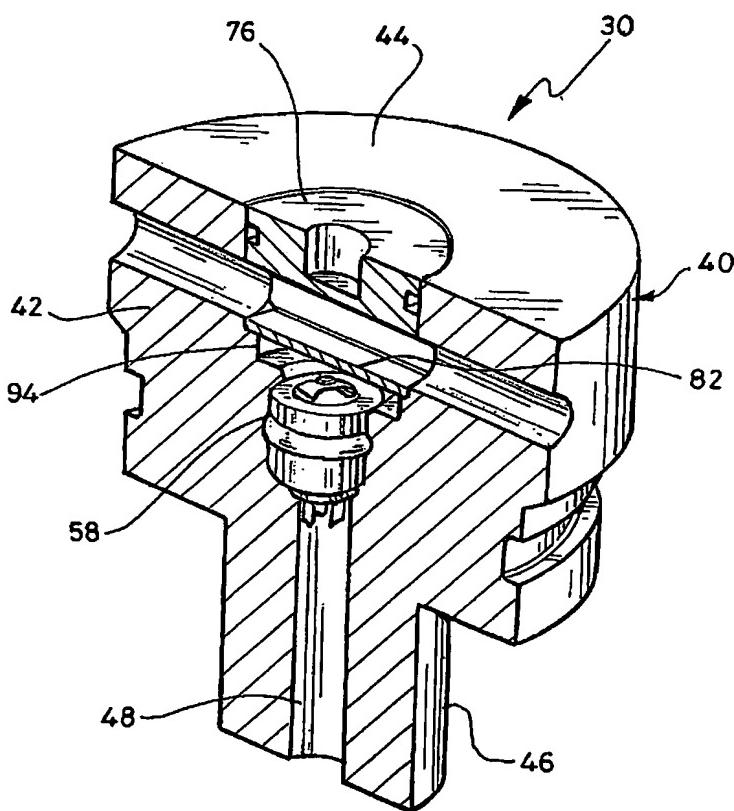
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[Continued on next page]

(54) Title: METHODS AND APPARATUS FOR THE MEASUREMENT OF HYDROGEN SULPHIDE AND THIOLS IN FLUIDS



(57) Abstract: An electrochemical sensor for measuring the amount of hydrogen sulphide or thiols in a fluid in a wellbore comprises a temperature- and pressure-resistant housing containing a flow path for the fluids. The fluids flow over one side of a gas permeable membrane made of zeolite or a suitable ceramic material, the other side of the membrane being exposed to a chamber containing a reaction solution which together with the hydrogen sulphide or thiols create a redox reaction resulting in an electrical current dependent upon the amount of hydrogen sulphide or thiols in the fluid.



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